# Clean Cities National Conference and Expo

Infrastructure Development

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## Natural Gas Vehicle Coalition



#### **Natural Gas Vehicle Coalition**

- A national trade organization
- Dedicated to the development of a growing, sustainable and profitable market for vehicles powered by natural gas and hydrogen
- Represents more than 150 companies:
  - engine, vehicle and equipment manufacturers;
  - natural gas companies,
  - fleet operators
  - service providers;
  - environmental groups and government organizations interested in the promotion and use of natural gas and hydrogen as transportation fuels.

#### **Natural Gas Infrastructure**

- 1600 fueling stations nationwide:
  - Concentrations in California, Texas, Colorado, Arizona, Utah and New York
- Large range in station size options:
  - From multi-million transit stations to growing interest in home re-fueling
- 1.6 million miles of transmission and distribution lines delivering natural gas the virtually all cities in the country
- Reforming hydrogen from natural gas at (NGV) stations increasing recognized as best near/mid term option for hydrogen for fuel cell vehicles

### Gladstein & Associates

Cliff Gladstein

### Interstate Clean Transportation Corridor (ICTC)



## Interstate Clean Transportation Corridor

### Achievements ICTC Has Secured \$20.6 Million To:

- Deploy 457 Heavy-Duty LNG and LPG Trucks;
- Construct 20 Public Access Natural Gas Fueling Stations (17 LNG, 3 CNG);
- Reduce NOx Emissions by 313 Tons/yr;
- Reduce Diesel PM Emissions by 1.25 Tons/yr;
   and
- Displace 4.9 Million Gallons of Annual Diesel Consumption

## Interstate Clean Transportation Corridor

### **Common reasons for Infrastructure Gaps**

- Lack of communication
- Few or small local fleets
- Lack of incentives: regulatory; funding; other
- No one to play the role of organizer
- High cost of technologies

## **Benefits of Clean Cities Coalitions**

- Provides regional networking and partnering opportunities
- Provides info. on and access to \$\$
- Provides access to technical assistance
- Focus on niche-markets (hubs)
- Linkages between LDV, MDV, and HDV
- LNG and CNG station access
- Continuing education

# South Coast Air Quality Management District



Dean Saito

### Infrastructure Program Update

Clean Fuel Fund

• AES

Moyer Program

State Fund

1309.1 Priority Reserve

27 Stations Upgraded

37 New Stations

\$5,784,793

\$12,420,666

\$2,168,800

\$1,235,560

\$3,448,682

### Infrastructure Projects Initiated

- Provide incentive funding for construction of new CNG re-fueling stations Upgrade Existing CNG Stations
- Resolve Variation Between the Utility Gas Feed Meter and the Compressed Gas Dispenser Meter Reading
- Development and Demonstration of a Universal Card Reader System
- Novel LNG Liquefaction Technology –PG&E, CEC
- RFP for LNG Production w/in Basin
- CNG Station Upgrades for Future Hydrogen Fueling

### Infrastructure Projects Initiated

- Provide CNG Station Analysis for System Efficiency and Proper Performance
- Support AQMD Fleet Rules and Board CNG Infrastructure Directives
- Resolve Regulatory Compliance Issues
  - DOSH
  - Fire Departments
  - Building Officials

### Infrastructure Projects Initiated

- Provide Technical Assistance for LNG Fueling for Transit Properties
- SAE Standards for CNG, LNG Fueling and Dispensing
  - increase overall number of such fueling stations in strategic locations throughout the Basin
  - standardize fueling station design and construction, and provide outreach in two key market segments
- Coordinate Station Funding with MSRC

# California Energy Commission



**Peter Ward** 

#### Alternative Fuels Infrastructure Program

- \$6 million from Governor's FY2000 Budget
- \$5.1 million for cost-shared projects
- 32 Projects, up to 44 sites funded
- Projects to dispense LNG, CNG,L/CNG, LPG (propane) and Hydrogen
- Clean Fuels Market Assessment (2001 & 2003)

### **Efficient Vehicle Incentive Program**

- Incentive administered be Dealerships
- Eligible Vehicles:

Honda Hybrid Electric Vehicles-up to \$1,050\* (depending on Air district)

Honda Civic GX (CNG)-up to \$3,050\*

Ford Crown Victoria (CNG)-up to \$3,050\*

Ford F150 Pick-up (CNG)-up to \$3,050\*

Ford Vans (CNG)-up to \$3,050\*

1,465 Hybrids and 66 CNG vehicles so far

#### **Information Available**

- Reducing California's Petroleum Dependence, Staff Draft Report, #600-03-005SD.
- Clean Fuels Market Assessment 2001, 600-01-018. 2003 Update available in June 2003.

www.energy.ca.gov